

JUL 05 2005

U.S. DEPARTMENT OF COMMERCE  
PATENT AND TRADEMARK OFFICEINFORMATION DISCLOSURE STATEMENT  
BY APPLICANT

(37 CFR 1.98(b))

Sheet 1 of 4

ATTY DOCKET NO.: 263.PC2 SERIAL NO.: 10/687,373

APPLICANT: Chen et al.

FILING DATE: 10/16/03

GROUP ART UNIT: 1625

EXAMINER NAME:

## U.S. PATENT DOCUMENTS

Examiner initials	Cite No.	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages Or Relevant Figures Appear
NH		3,113,135	12-03-1963	HODEL ET AL	
NH		4,816,570	03-28-1989	FARQUHAR	
NH		4,968,788	11-06-1990	FARQUHAR	
NH		5,252,560	10-12-1993	MYERS ET AL	
NH		5,324,839	06-28-1994	Clemence et al.	
NH		5,538,988	07-23-1996	MARTINEZ ET AL	
NH		5,602,146	02-11-1997	Billhardt-Troughton et	
NH		5,663,159	09-02-1997	STARRETT JR. ET AL	
NH		5,792,756	08-11-1998	STARRETT JR. ET AL	
NH		5,798,340	08-25-1998	BISCHOFBERGER ET AL	
NH		5,854,275	12-29-1998	ROBINSON	
NH		6,187,907	02-13-2001	CHEN ET AL	
NH		6,218,402	04-17-2001	Chalmers et al.	
NH		6,245,806	06-12-2001	DOMBROWSKI ET AL	
NH		6,271,402	08-07-2001	SINGH ET AL	
NH		6,310,211	10-30-2001	VAILLANCOURT ET AL	
NH		6,312,662	11-06-2001	ERION ET AL	
NH		6,395,743	05-28-2002	HEIMBUCH ET AL	

## FOREIGN PATENT DOCUMENTS

Examiner initials	Cite No.	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines Where Relevant Passages Or Relevant Figures Appear	T
NH		WO 00/39086 A1	07-06-2000	SHIONOGI & CO., LTD		
NH		WO 00/75122 A1	12-14-2000	SHIONOGI & CO., LTD		
NH		WO 01/00578 A1	01-04-2001	MERCK & CO. INC.		
NH		WO 02/055079	07-18-2002	MERCK & CO. INC.		
NH		WO 02/30426 A1	04-18-2002	MERCK & CO. INC.		

EXAMINER

DATE CONSIDERED 07-12-2006


EXAMINER: Initial citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

FORM PTO-1449  <b>U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE</b>  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>  <small>(37 CFR 1.98(b))</small>	ATTY DOCKET NO.: 263.PC2	SERIAL NO.: 10/687,373
	APPLICANT: Chen et al.	
	FILING DATE: 10/16/03	GROUP ART UNIT: 1625
	EXAMINER NAME:	
Sheet 2 of 4		

Examiner initials	Cite No.	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines Where Relevant Passages Or Relevant Figures Appear	T
Nh		WO 02/30930 A2	04-18-2002	MERCK & CO. INC.		
Nh		WO 02/30931 A2	04-18-2002	MERCK & CO. INC.		
Nh		WO 02/36734 A2	05-10-2002	MERCK & CO. INC.		
Nh		WO 91/19721 A1	12-26-1991	GLAZIER, ARNOLD		
Nh		WO 99/62513 A1	12-09-1999	MERCK & CO. INC.		
Nh		WO 99/62520 A1	12-09-1999	MERCK & CO. INC.		

#### NON PATENT LITERATURE DOCUMENTS

Examiner initials	Cite No.	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T
Nh		ARTERBURN et al., "Catalytic Amination of 2-Substituted Pyridines with Hydrazine Derivatives", 3(9):1351-1354, ORGANIC LETTERS, 2001	
Nh		ARTICO et al, "Geometrically and Conformationally Restrained Cinnamoyl Compounds as Inhibitors of HIV-1 Integrase: Synthesis, Biological Evaluation, and Molecular Modeling", 41:3948-3960, J MED CHEM, 1998	
Nh		BEAUCHAMP ET AL., "Guanine, Pyrazolo[3,4-d]pyrimidine, and Triazolo[4,5-d]pyrimidine (8-Azaguanine) Phosphonate Acyclic Derivatives as Inhibitors...", 39(4):949-956, J MED CHEM, 1996	
Nh		BHUTA ET AL, "Analogues of Chloramphenicol: Circular Dichroism Spectra, Inhibition of Ribosomal Peptidyltransferase, and Possible Mechanism of Action", 23(12):1299-1305, J MED CHEM, 1980	
Nh		Benzaria et al, "Synthesis, in Vitro Antiviral Evaluation, and Stability Studies of Bis(S-acyl-2-thioethyl) Ester Derivatives of 9-[2-(Phosphonomethoxy)ethyl]adenine (PMEA) as Potential PMEA-Prodrugs with Improved Oral Bioavailability", 39:4958-4965, J MED CHEM, 1996	
Nh		Bigge et al., "Exploration of N-Phosphonoalkyl-, N-Phosphonoalkenyl-, and N-(Phosphonoalkyl)phenyl-Spaced...", 35(8):1371, J MED CHEM, 1992	
Nh		Buolamwini et al, "CoMFA and CoMSIA 3D QSAR and Docking Studies on Conformationally-Restrained Cinnamoyl HIV-1 Integrase Inhibitors: Exploration of a Binding Mode at the Active Site", 45:841-852, J MED CHEM, 2002	
Nh		CAMPAGNE ET AL, "(1H-Benzotriazol-1-yloxy)tris(dimethylamino)phosphonium Hexafluorophosphate-and-Benzotriazol-1-yloxy)tripyrrolidinophosphonium Hexafluorophosphate-Mediated Activation of Monophosphonate Esters: Synthesis of Mixed Phosphonate Diesters...", 60(16):5214-5223, J ORG CHEM, 1995	
Nh		CATES et al., "Phosphorus Analogues of -Aminobutyric Acid, A New Class of Anticonvulsants", 27(5):654-659, J MED CHEM, 1984	

EXAMINER		DATE CONSIDERED 0712-06
EXAMINER: Initial citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.		

FORM PTO-1449	ATTY DOCKET NO.: 263.PC2	SERIAL NO.: 10/687,373
<b>U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE</b>  <b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>	APPLICANT: Chen et al.	
	FILING DATE: 10/16/03	GROUP ART UNIT: 1625
	EXAMINER NAME:	
(37 CFR 1.98(b))		
Sheet 3 of 4		

Examiner initials	Cite No.	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T
Ch		CHEN ET AL, "Design, Synthesis, and Biochemical Evaluation of Phosphonate and Phosphonamide Analogs of Glutathionylspermidine as Inhibitors...", 40(23):3842-3850, J MED CHEM, 1997	
Ch		COREY et al, "Selective Cleavage of Allyl Ethers Under Mild Conditions By Transition Metal Reagents", 38(18):3224, J ORG CHEM, 1973	
Ch		Chen et al, "Structure-Based Design of a Novel, Potent, and Selective Inhibitor for MMP-13 Utilizing NMR Spectroscopy and Computer-Aided Molecular Design", 122:9648-9654, J AM CHEM SOC, 2000	
Ch		Chen et al, "Anthranilate Sulfonamide Hydroxamate TACE Inhibitors, Part 1: Structure-Based Design of Novel Acetylenic P1' Groups", 12:1195-1198, BIOORG MED CHEM LETT, 2002	
Ch		Chen et al, "Structure-Based Design of Potent Inhibitors of Scytalone Dehydratase; Displacement of a Water Molecule from the Active Site", 37:17735-17744, BIOCHEM, 1998	
Ch		Chihab-Eddine et al, "Synthesis and reactivity of (1S)-N-(1-phenylethyl)maleimide towards nucleophiles: an application to preparation of chiral pyrrolisothiochroman and pyrrolobenzod[thi]epine based...", 42:573-576, TET LETT, 2001	
Ch		DAVIES ET AL, "Dinucleotide Analogues as Inhibitors of Thymidine Kinase, Thydylate Kinase, and Ribonucleotide Reductase", 31(7):1305-1308, J MED CHEM, 1988	
Ch		DeLombaert et al, "N-Phosphonomehtly Dipeptides and Their Phosphonate Prodrugs, a New Generation of Neutral Endopeptidase (NEP 3.4.24.11) Inhibitors", 37:498, J MED CHEM, 1994	
Ch		GALEOTTI ET AL, "A Straightforward Synthesis of -Amino Phosphonate Monoesters Using BroP or TPYCIU", 37(23):3997-3998, TET LETT, 1996	
Ch		Gali et al, "Facile Ring-Opening Reactions of Phthalimides as a New Strategy to Synthesize Amid Functionalized Phosphonates, Primary Phosphines, and Bisphosphines", 65(3):676-680, J ORG CHEM, 2000	
Ch		Goldgur et al, "Structure of the HIV-1 integrase catalytic domain complexed with an inhibitor: A platform for antiviral drug design", 96:13040-13043, PROC NATL ACAD SCI, 1999	
Ch		Jing et al, "Potassium-Dependent Folding: A Key to Intracellular Delivery of G-Quartet Oligonucleotides as HIV Inhibitors", 41:5397-5403, BIOCHEM, 2002	
Ch		Khamnei et al, "Neighboring Group Catalysis in the Design of Nucleotide Prodrugs", 39:4109-4115, J MED CHEM, 1996	
Ch		LaForge et al., "Rotenone. XXVI. Synthesis of the Parent Substances of Some Characteristic Rotenone Derivatives", 55(7):3040-3048, J AM CHEM SOC, 1933	
Ch		Lam et al., "Cyclic HIV Protease Inhibitors: Synthesis, Conformational Analysis, P2/P2' Structure-Activity Relationship, and Molecular Recognition of Cyclic Ureas", 39:3514-3525, J MED CHEM, 1996	
Ch		MORGAN ET AL, "Structure-Based Design of an Inhibitor of the Zinc Peptidase Thermolysin", 116(8):3251-3260, J AM CHEM SOC, 1994	
Ch		MORR ET AL, "Formation of Phostonic Acids During The Reduction of Azidonucleosidephosphonic Acids", 42:8841-8843, TET LETT, 2001	

EXAMINER

DATE CONSIDERED 02/2/06

EXAMINER: Initial citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

U.S. DEPARTMENT OF COMMERCE  
PATENT AND TRADEMARK OFFICE

ATTY DOCKET NO.: 263.PC2 SERIAL NO.: 10/687,373

APPLICANT: Chen et al.

INFORMATION DISCLOSURE STATEMENT  
BY APPLICANT

FILING DATE: 10/16/03

GROUP ART UNIT: 1625

EXAMINER NAME:

(37 CFR 1.98(b))

Sheet 4 of 4

Examiner initials	Cite No.	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T
04		MUSIOL ET AL, "On the Synthesis of Phosphoramidate Peptides", 59(21):6144-6146, J ORG CHEM, 1994	
21		Matier et al, "Sulfamoyl Azides. Hydrolysis Rates and Hypotensive Activity", 15(5):538-541, J MED CHEM, 1972	
21		Matsumura, "Friedel and Crafts Reaction with 8-Hydroxyquinoline"; 57:124-128, J AM CHEM SOC, 1935	
21		Mattson et al., "An Improved Method for Reductive Alkylation of Amines Using Titanium (IV) Isopropoxide and Sodium Cyanoborohydride", 55(8):2552-2554, J ORG CHEM, 1990	
21		Mitchell et al, "Bioreversible Protection for the Phospho Group: Bioactivation of the Di(4-acyloxybenzyl) and Mono(4-acyloxybenzyl) Phosphoesters of Methylphosphonate and Phosphonoacetate", 2345, J CHEM SOC PERKIN TRANS I, 1992	
24		Ornstein et al, "Synthesis and Pharmacology of a Series of 3- and 4-(Phosphonoalkyl)pyridine- and -piperidine-2-carboxylic Acids. Potent N-Methyl-D-aspartate Receptor Antagonists", 32:827-833, J MED CHEM, 1989	
21		Pais et al, "Structure Activity of 3-Aryl-1,3-diketo-Containing Compounds as HIV-1 Integrase Inhibitors", 45:3184-3194, J MED CHEM, 2002	
21		Pallella et al., "Declining Morbidity and Mortality Among Patients with Advanced Human Immunodeficiency Virus Infection", 338:853-860, J MED CHEM, 1998	
24		Pommier et al, "Retroviral integrase inhibitors year 2000: update and perspectives", 47:139-148, ANTIVIRAL RES, 2000	
21		SADDY ET AL, "Selective Monodeprotection of Phosphonate, Phosphite, Phosphonate, and Phosphoramidate Benzyl Esters", 60(9):2946-2947, J ORG CHEM, 1995	
21		SASAKI et al., "Convenient Synthesis of Some Purine 8,5'-Imino Cyclonucleosides", 43(12):2320-2325, J ORG CHEM, 1978	
21		Serafinowska et al., "Synthesis and in Vivo Evaluation of Prodrugs of 9-[2-(Phosphonomethoxy)ethoxy]adenine", 38:1372-1379, J MED CHEM, 1995	
21		Smith et al, "A novel MyD-1 (SIRP-1) signaling pathway that inhibits LPS-induced TNF production by monocytes", 102(7):2532-2540, BLOOD, 2003	
21		VAN DER LAAN ET AL, "An Approach Towards the Synthesis of Oligomers Containing a N-2-Hydroxyethyl-aminomethylphosphonate Backbone: A Novel PNA Analogue", 37(43):7857-7860, TET LETT, 1996	
04		YAMAUCHI ET AL, "Synthesis of Peptides Analogs Containing(2-aminoethyl)phosphonic acid (ciliatine)", 49(7):1158-1163, J ORG CHEM, 1984	

EXAMINER

DATE CONSIDERED

07/12/01

EXAMINER: Initial citation considered. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.